

Title (en)

MODULE COMPOSED OF A BELT RETRACTOR AND A BELT PRETENSIONING DEVICE

Title (de)

BAUGRUPPE AUS EINEM GURTAUFROLLER UND EINEM GURTSTRAFFERANTRIEB

Title (fr)

MODULE CONSTITUE D'UN ENROULEUR DE CEINTURE ET D'UN PRETENSIONNEUR DE CEINTURE

Publication

EP 1053137 B1 20041013 (DE)

Application

EP 98966379 A 19981218

Priority

- DE 29801946 U 19980205
- EP 9808349 W 19981218

Abstract (en)

[origin: WO9939944A1] The invention relates to a module comprising a belt retractor (12) for a vehicle safety belt (16) wound on a spool (14) of said retractor (12), and a belt pretensioning device (10) which provides driving power for driving the spool (14) of said retractor (12) in the winding direction. The inventive module also comprises a gear assembly (20, 24; 30, 36) which is used for coupling the pretensioning device to the spool. The invention is characterised in that the gear ratio of the gear assembly (20, 24; 30, 36) changes during a pretensioning operation.

IPC 1-7

B60R 22/46

IPC 8 full level

B60R 22/46 (2006.01)

CPC (source: EP KR US)

B60R 22/46 (2013.01 - EP KR US); **B60R 22/4633** (2013.01 - EP US); **F16H 2035/003** (2013.01 - EP US)

Designated contracting state (EPC)

DE ES FR GB IT

DOCDB simple family (publication)

DE 29801946 U1 19980604; DE 59812135 D1 20041118; EP 1053137 A1 20001122; EP 1053137 B1 20041013; ES 2230746 T3 20050501; JP 2002502751 A 20020129; KR 20010052158 A 20010625; US 6416002 B1 20020709; WO 9939944 A1 19990812

DOCDB simple family (application)

DE 29801946 U 19980205; DE 59812135 T 19981218; EP 9808349 W 19981218; EP 98966379 A 19981218; ES 98966379 T 19981218; JP 2000530397 A 19981218; KR 20007008546 A 20000804; US 60127000 A 20000728